

AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (currently amended) A composite power amplifier structure, ~~characterized~~
~~by comprising:~~
 a first power amplifier (PA-2) configured as an auxiliary amplifier of a Doherty amplifier
and connected to an output node; and

 an even number of further power amplifiers configured into at least one Chireix pair (PA
1,1 PA 1,2) connected to said output node; ~~and~~

 circuitry for driving at least one Chireix pair by drive signals having amplitude dependent
phase over at least a part of the dynamic range of the composite amplifier structure.
2. cancelled.
3. (currently amended) The amplifier structure of claim 2, ~~characterized by means (40) for~~
~~driving wherein the circuitry is configured to drive~~ at least one Chireix pair in outphasing mode
over at least a part of the dynamic range of the composite amplifier structure.
4. (currently amended) The amplifier structure of claim 3, ~~characterized by means (40) for~~
~~driving wherein the circuitry is configured to drive~~ at least two Chireix pairs in outphasing mode
over different parts of the dynamic range of the composite amplifier structure.

5. (currently amended) The amplifier structure of claim 3, ~~characterized by means (40)~~
wherein the circuitry is configured to drive for driving at least one Chireix pair with substantially
linear current amplitudes above its corresponding outphased part of the dynamic range of the
composite amplifier structure.

6. (currently amended) The amplifier structure of claim 3, ~~characterized by means (40)~~
wherein the circuitry is configured to drive for driving at least one Chireix pair with substantially
linear current amplitudes below its corresponding outphased part of the dynamic range of the
composite amplifier structure.

7. (currently amended) The amplifier structure of claim 1, ~~characterized by means (40)~~
wherein the circuitry is configured to drive for driving said first power amplifier (PA-2) with
substantially zero current amplitudes below and substantially linear current amplitudes above a
predetermined output node voltage amplitude.

8. (currently amended) The amplifier structure of claim 1, ~~characterized in that~~ wherein
said structure forms a stand-alone composite amplifier.

9. (currently amended) The amplifier structure of claim 1, ~~characterized in that~~ wherein
said structure forms part of a composite amplifier including further power amplifiers.

10. (currently amended) A radio terminal having a composite power amplifier structure,
~~characterized by~~ comprising:

a first power amplifier (~~PA-2~~) configured as an auxiliary amplifier of a Doherty amplifier and connected to an output node; and

an even number of further power amplifiers configured into at least one Chireix pair (~~PA 1,1 PA 1,2~~) connected to said output node; and

circuitry for driving at least one Chireix pair by drive signals having amplitude dependent phase over at least a part of the dynamic range of the composite amplifier structure.

11. cancelled.

12. (currently amended) The radio terminal of claim ~~11~~10, ~~characterized by means (40) for driving at~~ wherein the circuitry is configured to drive least one Chireix pair in outphasing mode over at least a part of the dynamic range of the composite amplifier structure.

13. (currently amended) The radio terminal of claim 12, ~~characterized by means (40) for driving at~~ wherein the circuitry is configured to drive least two Chireix pairs in outphasing mode over different parts of the dynamic range of the composite amplifier structure.

14. (currently amended) The radio terminal of claim 12, ~~characterized by means (40) for driving at~~ wherein the circuitry is configured to drive least one Chireix pair with substantially linear current amplitudes above its corresponding outphased part of the dynamic range of the composite amplifier structure.

15. (currently amended) The radio terminal of claim 12, ~~characterized by means (40) for driving wherein the circuitry is configured to drive~~ at least one Chireix pair with substantially linear current amplitudes below its corresponding outphased part of the dynamic range of the composite amplifier structure.

16. (currently amended) The radio terminal of claim 10, ~~characterized by means (40) for driving wherein the circuitry is configured to drive~~ said first power amplifier (PA 2) with substantially zero current amplitudes below and substantially linear current amplitudes above a predetermined output node voltage amplitude.

17. (currently amended) The radio terminal of claim 10, ~~characterized in that~~ wherein said structure forms a stand-alone composite amplifier.

18. (currently amended) The radio terminal of claim 10, ~~characterized in that~~ wherein said structure forms part of a composite amplifier including further power amplifiers.

19. (currently amended) The radio terminal of claim 10, ~~characterized in that~~ wherein said radio terminal is a mobile radio terminal.

20. (previously presented) The radio terminal of claim 10, wherein said radio terminal is a base station.

21. (currently amended) A method of driving a composite amplifier structure including an odd number of power amplifiers connected to a common load, said method ~~being characterized by the steps of~~ comprising:

driving a first power amplifier with substantially zero current amplitudes below and substantially linear current amplitudes above a predetermined output node voltage; and

driving at least one Chireix pair by drive signals having amplitude dependent phase over at least a part of the dynamic range of the composite amplifier.

22. (currently amended) The method of claim 21, characterized by ~~the step of~~ driving at least one Chireix pair in outphasing mode over at least a part of the dynamic range of the composite amplifier structure.

23. (currently amended) The method of claim 22, characterized by ~~the step of~~ driving at least two Chireix pairs in outphasing mode over different parts of the dynamic range of the composite amplifier structure.

24. (currently amended) The method of claim 22, characterized by ~~the step of~~ driving at least one Chireix pair with substantially linear current amplitudes above its corresponding outphased part of the dynamic range of the composite amplifier structure.

25. (currently amended) The method of claim 22, characterized by ~~the step of~~ driving at least one Chireix pair with substantially linear current amplitudes below its corresponding outphased part of the dynamic range of the composite amplifier structure.

REMARKS

Reconsideration and allowance of the subject application are respectfully requested.

Applicants submit an Information Disclosure Statement listing references referred to in the Background of the application, and copies have been provided where necessary.

Consideration and return of an initialed IDS form are respectfully requested.

Applicants note with appreciation the Examiner's allowance of claims 21-25 and the indication of allowable subject matter in claims 2-7 and 11-16. Although Applicants do not acquiesce in the outstanding rejection of claims 1, 8, 10, 17, 19 and 20 based on Figures 1 and 2 of the instant application, in order to expedite prosecution of this application, claim 1 now incorporates allowable features from claim 2, and claim 10 now incorporates allowable features from claim 11.


With respect to the Examiner's reasons for allowance, Applicants agree that the combination of features recited in each of the independent claims is patentable. To the extent that the Examiner's reasons for allowance are inconsistent with or add additional limitations to the claims, Applicants respectfully disagree because the claims define the invention.

The application is now in condition for allowance. An early notice to that effect is earnestly solicited.

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Respectfully submitted,

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